Course syllabus for

Imaging and Functional Assessment, 3 credits

Bild- och funktionsdiagnostik, 3 hp
This course has been cancelled, for further information see Transitional provisions in the last version of the syllabus.
Please note that the course syllabus is available in the following versions:
Autumn2013 , Spring2014 , Autumn2014 , Autumn2018

Course code	2LK105
Course name	Imaging and Functional Assessment
Credits	3 credits
Form of Education	Higher Education, study regulation 2007
Main field of study	Medicine
Level	AV - Second cycle
Grading scale	Pass, Fail
Department	Department of Clinical Sciences, Danderyd Hospital
Decided by	Programnämnd 2
Decision date	2013-04-23
Revised by	Programme committee for study programme in medicine
Last revision	2024-06-18
Course syllabus valid from	Autumn 2018

Objectives

The general aim is that the student obtains advanced knowledge in image and functional medicine related to the integrating assignments.

The knowledge is structured according to the SOLO taxonomy (S1-S4) and the skills according to Miller's pyramid (M1-M4) *

Knowledge and understanding
The student should be able to:
- choose and apply adequate imaging and functional assessment methods for clinical diagnostics (S3).
- describe information that is important in a referral (S2).
- explain and theorise around contraindications for imaging and functional assessment methods in clinical work (S2).

Skills
The student should:
- know the practical steps to be taken before imaging (M1).
-be able to carry out image interpretation for commonly occurring imaging methods (M2).

Approach:

The student should:
- understand and apply radiation protection regulations to limit unnecessary radiation (S3).
- be able to apply an empathetic attitude towards the patient (S3).

Content

The course focuses on the most common issues within imaging and functional assessment diagnostics with practical training. In the course, radiological anatomy, different imaging methods and investigations of pathological conditions are included.

The course will focus on the integrating assignments of the study programme in medicine with main specialisation on Theme 4, regarding health and illness.

The course will have a patient-related clinical connection by the students participating in preparation of clinical rounds and in the actual x-ray rounds together with the radiologist.

Students may alone analyse and assess different cases based on those in Theme 4 including the integrating assignments. The cases will be analysed and discussed in seminars.

Integrating assignments in the course:
Lump in the groin
Blood in the faeces
Blood vomiting
Abdominal pain
Jaundice
Heartburn
Resistance in the abdomen
Deglutition disorders
Changed faeces habits
Lump in the breast
Blood in urine
Symptoms from lower urinary tract
Swelling/pain in testicle/scrotum
Asthenia/paralysis
Pain in neck and back
Joint pain
Trauma/injury Pain/discomfort/pressure in the breast
The broken leg

Teaching methods

In the course, lectures and seminars are included where clinicians from other specialities participate. Students participate in the radiologist's daily work and will obtain training in interpreting images and formulating responses. Formative feedback is given.
The student should select during clinical duties one interesting case that is presented at the end of the course

Compulsory modules: To achieve the learning objectives, participation is required in the interactive seminars, the case studies and the practical exercises.

The course director decides if and how absence may be compensated. Before the student has participated in compulsory parts, or compensated absence in accordance with the course director's instructions, the student's results for respective parts will not be registered in LADOK.

Examination

Examination:

1) Continuous formative assessment at seminars.
2) Oral and individual presentation of a selected case

Limitations in the number of examination or practical training sessions:
The number of examination and practical training sessions follows the local guidelines of Karolinska Institutet, which means that the number of examinations is limited to 6, while placement, as a rule, may be repeated only once.

The examiner may, with immediate effect, interrupt a student's clinical placement (or equivalent) if the student demonstrates such serious deficiencies in knowledge, skills or attitude that patient safety or patient confidence in healthcare is at risk. If a clinical placement is interrupted in this way the student is deemed to have failed that element and to have used up one clinical placement opportunity.

In such cases, an individual action plan should be set up stating which activities and tests are required before the student is qualified for a new clinical placement on the course.

Eligibility
A student failing due to shortcoming in knowledge skills or attitudes, thus jeopardising patient safety and/or trust in medical care, can be assigned to a new clinical placement only after having completed objectives set in the individual plan.

Transitional provisions

For a course that has been closed down or undergone major changes, at least two additional examinations (excluding regular examinations) in the earlier contents are provided during a period of a year from the date of the change.

Other directives

The course connects to and deepen speciality knowledge within the study programme in medicine.

Course evaluation takes place according to the guidelines that have been stated by the Board of Education at Karolinska Institutet.

The course may not be included in a degree at the same time as an advanced course completed inside or outside the country, the contents of which fully or essentially correspond to the current course contents. If you are uncertain \x{2013} contact the study guidance.

* Level tiering according to the SOLO taxonomy:
S1) simple (ex. know, identify),
S2) composite (ex. account for, describe),
S3) related (ex. analyse, relate), and
S4) extended (ex. theorise, analyse).

Level tiering according to Miller's pyramid:
M1) know,
M2) know how one carries out
M3) be able to show, and
M4) be able to carry out professional.

Literature and other teaching aids